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TECH CENTER 1600/2900

<110> Universiteit Utrecht  
Strous, Gerardus  
Van Kerkhof, Petrus  
Govers, Roland

<120> CONTROLLING AVAILABILITY OR ACTIVITY OF PROTEINS BY USE OF PROTEASE  
INHIBITORS OR RECEPTOR FRAGMENTS

<130> 2183-4525US

<140> Filed concurrently with application

<141> 2000-09-12

<150> PCT/NL99/00136

<151> 1999-03-12

<150> EP98200799.9

<151> 1998-03-12

<160> 50

<170> PatentIn version 3.0

<210> 1

<211> 8

<212> PRT

<213> Unknown organism

<220> Binding polypeptide motif

<221> Binding

<222> (1)..(8)

<223> Residues 1, 5-6 and 8 can be any amino acid

<220> Binding polypeptide motif

<221> E

<222> (2)..(2)

<223> The amino acid E (glutamic acid can be replaced by D

<220> Binding polypeptide motif

<221> F

<222> (3)..(3)

<223> The amino acid F can be replaced by Y

<220> Binding polypeptide motif

<221> I

<222> (4)..(4)

<223> The amino acid I can be replaced by L, V or F

<220> Binding polypeptide motif

<221> D

<222> (8)..(8)

<223> The amino acid D can be replaced by E

<400> 1

Xaa Glu Phe Ile Xaa Xaa Asp Xaa

1

<210> 2

<211> 12

<212> PRT

<213> Unknown Organism

<220> Growth hormone receptor binding motif

<221> Binding  
 <222> (321)...(332)  
 <223> Binds to hormone receptor and ubiquitin  
 <400> 2  
 Asp Asp Ser Trp Val Glu Phe Ile Glu Leu Asp Ile  
 1 5 10

<210> 3  
 <211> 10  
 <212> PRT  
 <213> Unknown Organism  
 <220> Growth hormone receptor binding motif  
 <221> Binding  
 <222> (322)...(333)  
 <223> Binds to hormone receptor and ubiquitin  
 <400> 3  
 Asp Ser Trp Val Glu Phe Ile Glu Leu Asp  
 1 5 10

<210> 4  
 <211> 129  
 <212> PRT  
 <213> Unknown organism  
 <220> Synthetic peptide  
 <221> Binding  
 <222> Derived from protein receptor  
 <223> Up-regulates GH activity  
 <400> 4  
 Ser Lys Gln Gln Arg Ile Lys Met Leu Ile Leu Pro Pro Val Pro Val  
 1 5 10 15  
 Pro Lys Ile Lys Gly Ile Asp Pro Asp Leu Leu Lys Glu Gly Lys Leu  
 20 25 30  
 Glu Glu Val Asn Thr Ile Leu Ala Ile His Asp Ser Tyr Lys Pro Glu  
 35 40 45  
 Phe His Ser Asp Asp Ser Trp Val Glu Phe Ile Glu Leu Asp Ile Asp  
 50 55 60  
 Glu Pro Asp Glu Lys Thr Glu Glu Ser Asp Thr Asp Leu Leu Ser Ser  
 65 70 75 80  
 Asp His Glu Lys Ser His Ser Asn Leu Gly Val Lys Asp Gly Asp Ser  
 85 90 95  
 Gly Arg Thr Ser Cys Cys Glu Pro Asp Ile Leu Glu Thr Asp Phe Asn  
 100 105 110  
 Ala Asn Asp Ile His Glu Gly Thr Ser Glu Val Ala Gln Pro Gln Arg  
 115 120 125  
 Leu

<210> 5  
 <211> 38  
 <212> PRT  
 <213> Unknown organism  
 <220> Synthetic peptide  
 <221> Binding  
 <222> Derives from protein receptor  
 <223> Up-regulates GH activity  
 <400> 5  
 Lys Asp Gly Asp Ser Gly Arg Thr Ser Cys Cys Glu Pro Asp Ile Leu  
 1 5 10 15  
 Glu Thr Asp Phe Asn Ala Asn Phe Ile His Glu Gly Thr Ser Glu Val

20  
Ala Gln Pro Gln Arg Leu  
35

25

30

<210> 6  
<211> 10  
<212> PRT  
<213> Unknown organism  
<220> Glut4 Ins-regulated glucose transporter binding motif  
<221> Binding  
<222> Derived from protein receptor  
<223> Binds to ubiquitin/proteasome system binding site  
<400> 6

Thr Glu Leu Glu Tyr Leu Gly Pro Asp Glu  
1 5 10

B'  
<210> 7  
<211> 7  
<212> PRT  
<213> Unknown organism  
<220> Binding poly-peptide motif  
<221> Binding  
<222> Derived from protein receptor  
<223> Binds to ubiquitin/proteasome system binding site  
<400> 7

Cys Glu Glu Asp Phe Tyr Arg  
1 5

<210> 8  
<211> 10  
<212> PRT  
<213> GHR sequence (human, rabbit)  
<400> 8

Ser Trp Val Glu Phe Ile Glu Leu Asp Ile  
1 5 10

<210> 9  
<211> 10  
<212> PRT  
<213> GHR chicken  
<400> 9

Leu Trp Val Glu Phe Ile Glu Leu Asp Ile  
1 5 10

<210> 10  
<211> 10  
<212> PRT  
<213> prolactin receptor, human  
<400> 10

Leu Leu Val Glu Tyr Leu Glu Val Asp Asp  
1 5 10

<210> 11  
<211> 10  
<212> PRT  
<213> prolactin receptor, rabbit, rat, mouse  
<400> 11

Leu Leu Val Glu Phe Leu Glu Asn Asp Asp

1 5 10  
 <210> 12  
 <211> 10  
 <212> PRT  
 <213> Ca++ channel  
 <400> 12  
 Asp Asn Val Asp Tyr Leu Thr Arg Asp Trp  
 1 5 10

<210> 13  
 <211> 10  
 <212> PRT  
 <213> FGF Receptor Family  
 <400> 13  
 Gln Ala Ala Glu Tyr Leu Arg Ser Glu Thr  
 1 5 10

<210> 14  
 <211> 10  
 <212> PRT  
 <213> Transmembrane receptor sex precursor  
 <400> 14  
 Ile Asp Ala Glu Tyr Ile Ser Ala Glu Arg  
 1 5 10

<210> 15  
 <211> 10  
 <212> PRT  
 <213> IgE Receptor  
 <400> 15  
 Leu Lys Gly Glu Phe Ile Trp Val Asp Gly  
 1 5 10


<210> 16  
 <211> 10  
 <212> PRT  
 <213> ANGIOTENSIN CONVERTING ENZYME  
 <400> 16  
 Tyr Gly Ser Glu Tyr Ile Asn Leu Asp Gly  
 1 5 10

<210> 17  
 <211> 10  
 <212> PRT  
 <213> POTASSIUM CHANNEL IRK  
 <400> 17  
 Ser Glu Gly Glu Tyr Ile Pro Leu Asp Gln  
 1 5 10

<210> 18  
 <211> 10  
 <212> PRT  
 <213> PDGF RECEPTOR ALPHA-CHAIN  
 <400> 18  
 Asp Gly His Glu Tyr Ile Tyr Val Asp Pro  
 1 5 10

<210> 19  
<211> 10  
<212> PRT  
<213> PDGF RECEPTOR BETA-CHAIN  
<400> 19  
Asp Gly His Glu Tyr Ile Tyr Val Asp Pro  
1 5 10

<210> 20  
<211> 10  
<212> PRT  
<213> Ca++ -channel  
<400> 20  
Asp Asn Phe Glu Tyr Leu Thr Arg Asp Ser  
1 5 10

 <210> 21  
<211> 10  
<212> PRT  
<213> Cl- CHANNEL CLC7  
<400> 21  
Lys Ile Phe Glu Tyr Leu Arg Arg Asp Thr  
1 5 10

<210> 22  
<211> 10  
<212> PRT  
<213> TYROSINE-PROTEIN KINASE FRK  
<400> 22  
Ser Leu Gln Glu Tyr Leu Gln Asn Asp Thr  
1 5 10

<210> 23  
<211> 10  
<212> PRT  
<213> GLUT4 INS-REGULATED GLUCOSE TRANSPORTER  
<400> 23  
Thr Glu Leu Glu Tyr Leu Gly Pro Asp Glu  
1 5 10

<210> 24  
<211> 10  
<212> PRT  
<213> MHC-II(BETA) (RAT)  
<400> 24  
Asn Gln Glu Glu Tyr Leu Arg Tyr Asp Ser  
1 5 10

<210> 25  
<211> 10  
<212> PRT  
<213> ERB2 TKR  
<400> 25  
Glu Asn Pro Glu Tyr Leu Gly Leu Asp Val  
1 5 10

<210> 26  
<211> 10

<212> PRT  
<213> ANION TRANSPORTER I  
<400> 26  
Arg Leu Lys Glu Tyr Leu Ala Gly Asp Val  
1 5 10

<210> 27  
<211> 10  
<212> PRT  
<213> VASCULAR ENDOTHELIAL GROWTH FACTOR  
<400> 27  
Leu Tyr Lys Asp Phe Leu Thr Leu Glu His  
1 5 10

<210> 28  
<211> 10  
<212> PRT  
<213> VASCULAR ENDOTHELIAL GROWTH FACTOR  
<400> 28  
Glu Gln Lys Glu Tyr Lys Ser Tyr Asp Ala  
1 5 10

<210> 29  
<211> 10  
<212> PRT  
<213> G PROTEIN-ACT. INWARD RECTIFIER K+-CHANNEL-1  
<400> 29  
Pro Glu Gly Glu Phe Leu Pro Leu Asp Gln  
1 5 10

<210> 30  
<211> 10  
<212> PRT  
<213> PROTEIN-TYROSINE PHOSPHATASE ZETA  
<400> 30  
Ser Asp Ser Glu Phe Leu Leu Pro Asp Thr  
1 5 10

<210> 31  
<211> 10  
<212> PRT  
<213> GLUTAMATE (NMDA) RECEPTOR SUBUNIT EPSILON 2  
<400> 31  
Ser Ala Leu Asp Phe Ile Arg Arg Glu Ser  
1 5 10

<210> 32  
<211> 10  
<212> PRT  
<213> RHESUS BLOOD GROUP-ASSOCIATED GLYCOPROTEIN  
<400> 32  
Ala His Asn Glu Tyr Leu Val Ser Glu Ile  
1 5 10

<210> 33  
<211> 10  
<212> PRT  
<213> DIHYDROPYRIDINE-SENSITIVE 1-TYPE  
<400> 33

Val Thr Leu Asp Phe Leu Asp Ala Glu Leu  
1 5 10

<210> 34

<211> 10

<212> PRT

<213> THROMBOPOIETIN RECEPTOR

<400> 34

Glu Ile Ser Asp Phe Leu Arg Tyr Glu Leu  
1 5 10

<210> 35

<211> 10

<212> PRT

<213> SEROTONIN RECEPTOR 1B

<400> 35

Ser Ala Lys Asp Tyr Ile Tyr Gln Asp Ser  
1 5 10

<210> 36

<211> 10

<212> PRT

<213> EPIDERMAL GROWTH FACTOR

<400> 36

Tyr Gln Gln Asp Phe Phe Pro Lys Glu Ala  
1 5 10

<210> 37

<211> 10

<212> PRT

<213> SODIUM, CHLORIDE-DEPENDENT TRANSPORTER NTT4

<400> 37

Ser Lys Leu Gln Tyr Ile Leu Ala Gln Ile  
1 5 10

<210> 38

<211> 10

<212> PRT

<213> RHODOPSIN

<400> 38

Thr Pro Leu Asn Tyr Ile Leu Leu Asn Leu  
1 5 10

<210> 39

<211> 10

<212> PRT

<213> INTERLEUKIN-2 RECEPTOR BETA-CHAIN

<400> 39

Thr Ser Val Asp Leu Leu Asp Ile Asn Val  
1 5 10

<210> 40

<211> 10

<212> PRT

<213> cAMP-DEPENDENT PROTEIN KINASE C, ALPHA, BETA

<400> 40

Gly Thr Pro Asp Tyr Ile Ala Pro Glu Ile  
1 5 10

<210> 41  
<211> 10  
<212> PRT  
<213> CAMP-DEPENDENT PROTEIN KINASE DELTA, EPSILON, GAMMA  
<400> 41

Gly Thr Pro Glu Tyr Leu Ala Pro Glu Ile  
1 5 10

<210> 42  
<211> 10  
<212> PRT  
<213> SERINE/THREONINE KINASE PCTAIRE 1,2  
<400> 42

Leu Val Phe Glu Tyr Leu Asp Lys Asp Leu  
1 5 10

<210> 43  
<211> 10  
<212> PRT  
<213> SERINE/THREONINE KINASE PCTAIRE 3  
<400> 43

Leu Val Phe Glu Tyr Leu Asp Ser Asp Leu  
1 5 10

B' <210> 44  
<211> 10  
<212> PRT  
<213> SMALL GTP-BINDING PROTEIN Rab-7  
<400> 44

Ile Gly Ala Asp Phe Leu Thr Lys Glu Val  
1 5 10

<210> 45  
<211> 10  
<212> PRT  
<213> SMALL GTP-BINDING PROTEIN Rab-9  
<400> 45

Ile Gly Val Glu Phe Leu Asn Lys Asp Leu  
1 5 10

<210> 46  
<211> 10  
<212> PRT  
<213> SYNAPTOTAGMIN IV  
<400> 46

Ile Ser Val Glu Phe Leu Val Leu Asp Ser  
1 5 10

<210> 47  
<211> 10  
<212> PRT  
<213> GLUTAMATE DECARBOXYLASE (GAD67)  
<400> 47

Ser Asp Ile Asp Phe Leu Ile Glu Glu Ile  
1 5 10

<210> 48



<211> 10  
<212> PRT  
<213> FRUCTOSE 1,6 DIPHOSPHATASE (FBPase)  
<400> 48

Ala Ile Gly Glu Phe Ile Leu Val Asp Lys  
1 5 10

<210> 49  
<211> 10  
<212> PRT  
<213> CYSTIC FIBROSIS TRANSMEMBRANE CONDUCTANCE REGULATOR  
<400> 49

Gln Lys Gln Glu Tyr Lys Thr Leu Glu Tyr  
1 5 10

<210> 50  
<211> 5  
<212> PRT  
<213> EPITHELIAL Na<sup>+</sup> CHANNEL  
<220>

<221> X  
<222> (4)..(4)  
<223> X can be any amino acid  
<400> 50

Pro Pro Pro Xaa Tyr  
1 5

*B1  
series*